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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/982,815	10/22/2001	Joachim Runge	Q64443	8275
75	590 03/23/2004		EXAMINER	
SUGHRUE MION, PLLC			MAYO III, WILLIAM H	
_	nia Avenue, NW C 20037-3213		ART UNIT	PAPER NUMBER
			2831	
			DATE MAILED: 03/23/2004	4

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)	$-\psi$
	09/982,815	RUNGE ET AL.	
Office Action Summary	Examiner	Art Unit	
	William H. Mayo III	2831	
The MAILING DATE of this communication a Period for Reply	appears on the cover sheet wit	h the correspondence add	lress
A SHORTENED STATUTORY PERIOD FOR REITHE MAILING DATE OF THIS COMMUNICATION - Extensions of time may be available under the provisions of 37 CFR after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a less than the maximum statutory perions to reply within the set or extended period for reply will, by state Any reply received by the Office later than three months after the maximum date term adjustment. See 37 CFR 1.704(b).	N. 1.136(a). In no event, however, may a reply within the statutory minimum of thirty iod will apply and will expire SIX (6) MONT atute, cause the application to become ABA	ply be timely filed (30) days will be considered timely. HS from the mailing date of this cor NDONED (35 U.S.C. § 133).	
Status			
1) Responsive to communication(s) filed on 09	9 January 2004.		
	his action is non-final.		
3) Since this application is in condition for allow closed in accordance with the practice under		·	merits is
Disposition of Claims			
4) Claim(s) 1,3,4,6 and 7 is/are pending in the	application.		
4a) Of the above claim(s) is/are withd	frawn from consideration.		
5) Claim(s) is/are allowed.			
6)⊠ Claim(s) <u>1,3,4,6 and 7</u> is/are rejected.			
7) Claim(s) is/are objected to.			
8) Claim(s) are subject to restriction and	d/or election requirement.		
Application Papers			
9) The specification is objected to by the Exam	iner.		
10)☐ The drawing(s) filed on is/are: a)☐ a	accepted or b) objected to b	y the Examiner.	
Applicant may not request that any objection to t	•		
Replacement drawing sheet(s) including the corr			• •
11) The oath or declaration is objected to by the	Examiner. Note the attached	Office Action or form PT0	D-152.
Priority under 35 U.S.C. § 119			
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:		119(a)-(d) or (f).	
1. Certified copies of the priority docume		P 41	
2. Copies of the priority docume		·	N4
3. Copies of the certified copies of the particular application from the International Bure		eceived in this National S	stage
* See the attached detailed Office action for a I	, , , , , , , , , , , , , , , , , , , ,	eceived	
	.c. c. a.e corunos copico not i		
Attachment(s)	•		
1) Notice of References Cited (PTO-892)	4) 🔲 Interview Su	mmary (PTO-413)	
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s).	/Mail Date	152)
 Information Disclosure Statement(s) (PTO-1449 or PTO/SB/0 Paper No(s)/Mail Date 	08) 5) Notice of Inf 6) 0ther:	ormal Patent Application (PTO- -·	102)
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DETAILED ACTION

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
- 3. Claims 1, 3-4, and 6-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Applicant's Own Admission of Prior Art (herein referred to as AOAPA) in view of Jagersberger (Pat Num 5,477,007). AOAPA discloses well known multiple twisted conductors (Figs 1a-1b), comprising at least two individual twisted conductors of individual enamel insulated partial conductors (see background of Invention). Specifically, with respect to claim 1, AOAPA discloses a multiple twisted conductor (Figs 1a-1b) comprising at least two individual conductors (1 & 2), each of

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which comprises a stack of uneven number of individual enamel insulated partial conductors (3) and a joint sheath (5) surrounding the individual twisted conductors (1 & 2), wherein the individual twisted conductors (1 & 2) are arranged inside the common sheath (6) without any insulating layer of their own (Col 3, lines 40-45, Fig 2), wherein the individual twisted conductors (1 & 2) are spaced apart from one another by spacers (6) that are made of insulating material (see Detailed Description of Prior Art Fig 3 on page 3). With respect to claim 3, AOAPA discloses that the spacer (5) is an insulating material (see Detailed Description of Prior Art Fig 3 on page 3). With respect to claim 4, AOAPA disclose a process for producing multiple twisted conductors (Figs 1a-1b) in which at least one individual twisted conductors (1 & 2) comprising individual enamel insulated partial conductors (3) may be pulled from at least some supply reel, joined, and provided with a joint sheath (5) surrounding the individual twisted conductors (1 & 2), wherein the process also further comprises the step of providing individual twisted conductors (1 & 2) which are arranged inside the common sheath (5), wherein the individual twisted conductors (1 & 2) are spaced apart from one another by spacers (6) that are made of insulating material (see Detailed Description of Prior Art Fig 3 on page 3). With respect to claim 6, AOAPA discloses that the spacer (5) is an insulating material (see Detailed Description of Prior Art Fig 3 on page 3). With respect to claim 7, AOAPA discloses a process wherein the first twisted conductor (1 & 2) is produced from a plurality of partial conductors (3) by Roebel transposition and in the production of the second one of the at least two individual twisted conductors, wherein the first one of

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the at least two individual twisted conductors together with the second one of the two individual twisted conductors (1 & 2) are provided with a common insulating sheath (5).

However, AOAPA doesn't necessarily disclose the at least two individual twisted conductors wherein the individual twisted conductors are arranged inside the common sheath without any insulating layer of their own (claim 1), nor the spacer being pressboard (claim 3), nor a method of providing at least two individual twisted conductors with a common insulating sheath without any insulating layer of their own (claim 4), nor process of manufacturing a spacer being pressboard (claim 6).

Jagersberger teaches a multiple twisted conductor (Figs 1-3), which permits better utilization of materials while simultaneously reducing the construction size (CoI 2, lines 15-16). Specifically, with respect to claim 1, Jagersberger teaches a multiple twisted conductor (Figs 1-3) comprising at least two individual conductors (1) comprising individual enamel insulated partial conductors (2) and a joint sheath (6) surrounding the individual twisted conductors (1), wherein the individual twisted conductors (1) are arranged without any insulating layer of their own (CoI 3, lines 40-45, Fig 2). With respect to claim 3, Jagersberger teaches that the spacer (5) may be pressboard (CoI 3, lines 57-60). With respect to claim 4, Jagersberger teaches a process for producing a multiple twisted conductor (Figs 1-3) in which at least one individual twisted conductors (1) comprising individual enamel insulated partial conductors (2) may be pulled from at least some supply reel, joined, and provided with a joint sheath (6) surrounding the individual twisted conductors (1), wherein the process also further comprises the step of providing individual twisted conductors (1) which are

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arranged without any insulating layer of their own (Col 3, lines 40-45, Fig 2). With respect to claim 6, Jagersberger teaches a process wherein the spacer (5) may be pressboard (Col 3, lines 57-60).

With respect to claims 1, 3, 4, and 6, it would have been obvious to one having ordinary skill in the art of cables at the time the invention was made to modify the twisted conductors of AOAPA to comprise the conductor configuration as taught by Jagersberger because Jagersberger teaches that such a configuration provides a winding which permits better utilization of materials while simultaneously reducing the construction size (Col 2, lines 15-16) and since it has been held that omission of an element and its function in a combination where the remaining elements perform the same functions as before involves only routine skill in the art. In re Karlson, 136 USPQ 184.

Response to Arguments

- 4. Applicant's arguments filed January 9, 2004 have been fully considered but they are not persuasive. The applicant argues the following:
 - A) There is simply no motivation for one having ordinary skill in the art to utilize the cooling channels to space apart the individual twisted conductors of the admitted prior art.
- 5. With respect to argument A, the examiner respectfully traverses. In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or

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modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See In re Fine, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988)and In re Jones, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, AOAPA discloses well known multiple twisted conductors (Figs 1a-1b), comprising at least two individual twisted conductors of individual enamel insulated partial conductors (see background of Invention), except the at least two individual twisted conductors wherein the individual twisted conductors are arranged inside the common sheath without any insulating layer of their own (claim 1) and the spacer being pressboard (claim 3), and the method of producing both (claims 4 & 6). Jagersberger also teaches a multiple twisted conductor (Figs 1-3), which permits better utilization of materials while simultaneously reducing the construction size (Col 2, lines 15-16). Clearly, there exist a motivation for arranging the AOAPA twisted conductors structure to comprise the conductor configuration as taught by Jagersberger because Jagersberger teaches that such a configuration provides a winding which permits better utilization of materials while simultaneously reducing the construction size (Col 2, lines 15-16) and since it has been held that omission of an element and its function in a combination where the remaining elements perform the same functions as before involves only routine skill in the art. In re Karlson, 136 USPQ 184. The reduction of materials and construction size, is the exact motivation the applicant has for modifying the AOAPA. Specifically, the applicant states on pages 1-2, lines 23-24 & 1, respectively,

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"Summary of the Invention"

An object of the present invention is to provide a multiple twisted conductor with reduced outside dimensions and a process for cost-effectively producing the multiple twisted conductor.

Secondly, it there exist a reasonable amount of success for modifying the AOAPA, especially since the applicant has attempted the same motivation. Thirdly, the motivation discloses all of the claimed elements. Therefore, a proper prima facie case of obviousness exist and the combination of the AOAPA and Jagersberger is proper and just. The applicant argues that Jagersberger discloses that spacers (5) are cooling channels and not spacers. However, Jagersberger discloses that intermediate pieces (5) provide a space (4) for radial flow of coolant, and doesn't state that the intermediate pieces themselves are cooling channels (Col 3, lines 35-40). Therefore, the examiner respectfully submits that the 35 USC 103(a) rejection is proper and just.

Conclusion

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the

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shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Communication

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to William H. Mayo III whose telephone number is (571)-272-1978. The examiner can normally be reached on M-F 8:30am-6:00 pm (alternate Fridays off).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean Reichard can be reached on (571) 272-2800 ext 31. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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